

AMENDMENTS TO THE CLAIMS

Please cancel claims 28, 31, 32, 36 and 37, and amend claims 2, 5, 6, 24 and 29 as follows (a complete listing of the claims is provided below pursuant to 37 CFR 1.121):

Claim 1. (Cancelled).

- 1 2. (Currently Amended) A method of making a catheter, comprising the steps of:
2 winding a filament onto a core member while rotating the core member relative to
3 a filament source and passing the filament source in a first direction of axial movement
4 relative to the core member; and
5 reversing a direction of axial movement of the filament source while continuing to
6 wind the filament onto the core member, whereby the filament is continuously wound
7 onto the core member to form a first fibrous layer as the filament source is moved relative
8 to the core member from a first axial position to a second axial position and then back to
9 the first axial position;
10 wherein said step of winding a filament comprises winding a group of filaments
11 simultaneously;
12 further comprising the step of providing a guide assembly having a filament
13 engaging surface, and arranging said guide assembly such that the filament engaging
14 surface lies in a plane which is generally perpendicular to a longitudinal axis of the core
15 member; and

16 further comprising the step of passing the group of filaments through the guide
17 assembly to arrange the group of filaments into the plane which is generally perpendicular
18 to the longitudinal axis of the core member and to cause the filaments within said group
19 of filaments to be positioned side-by-side and packed tightly against one another as the
20 group of filaments are wound onto the core member;
21 The method of making a catheter according to claim 28; further comprising the
22 step of anchoring the group of filaments at or near a proximal end of the core member
23 before winding the group of filaments onto the core member.

1 3. (Previously Presented) The method of making a catheter according to claim 2,
2 wherein the group of filaments is wound onto the core member continuously from the
3 proximal end of the core member to a distal end thereof and then back to the proximal
4 end.

Claim 4. (Cancelled).

1 5. (Currently Amended) The method of making a catheter according to claim 2
2 28, wherein the core member is a mandrel on which the catheter is formed.

1 6. (Currently Amended) The method of making a catheter according to claim 2
2 28, wherein the core member is a substrate that forms an inner lining of the catheter.

Claims 7 to 23. (Cancelled).

1 24. (Currently Amended) The method of making a catheter according to claim 2
2 28, wherein said group of filaments are wound with a variable pitch such that a filament
3 group spacing at a distal end of the core member is narrower than a filament group
4 spacing at a proximal end of the core member.

Claims 25 to 28. (Cancelled).

1 29. (Currently Amended) The method of making a catheter according to claim 2
2 28, further comprising the step of varying a rotation speed of the core member or a
3 translation speed of the filament source along the core member to vary a pitch of the
4 group of filaments being wound onto the core member.

Claims 30 to 50. (Cancelled).

1 51. (Previously Presented) A method of making a catheter, comprising the steps
2 of:
3 anchoring a group of filaments to a core member at a proximal end of the catheter;
4 winding the group of filaments simultaneously onto the core member while

5 rotating the core member relative to a filament source and passing the filament source in a
6 first direction of axial movement relative to the core member toward a distal end of the
7 catheter; and

8 reversing a direction of axial movement of the filament source while continuing to
9 wind the group of filaments simultaneously onto the core member, whereby the group of
10 filaments are continuously wound onto the core member to form a fibrous layer as the
11 filament source is moved relative to the core member from the proximal end to the distal
12 end and then back to the proximal end;

13 further comprising the step of passing the group of filaments through a guide
14 assembly to arrange the group of filaments into a plane which is generally perpendicular
15 to a longitudinal axis of the core member; and to cause the filaments to be positioned
16 side-by-side and packed tightly against one another as the group of filaments are wound
17 onto the core member.